Patent claims

- 1-7 (canceled)
- 8. (new) A coolable layer system, comprising;
- a substrate;
- a coating on the substrate; and
- a plurality of cooling passages used for cooling purposes, the cooling passages at least partially adjoining the coating,

wherein at least two cooling passages cross one another and are arranged in groups that are crosswise with respect to one another so that the surface that is to be cooled is covered by the cooling passages that cross one another.

- 9. (new) The coolable layer system as claimed in claim 8, wherein the coolable layer system extends in a radial direction, and in that at least one cooling passage is at an angle of 0° to the radial orientation.
- 10. (new) The coolable layer system as claimed in claim 8, wherein the coolable layer system extends in a radial direction and at least one cooling passage is at an angle of 90° to the radial orientation.
- 11. (new) The coolable layer system as claimed in claim 8, wherein the coolable layer system extends in a radial direction and at least one cooling passage is at an angle between 0° to less than 90° to the radial orientation.
- 12. (new) The coolable layer system as claimed in claim 8, wherein at least one cooling passage is arranged at least partially within the coating.
- 13. (new) The coolable layer system as claimed in claim 8, wherein at least one cooling passage is arranged between two coatings.

14. (new) The coolable layer system as claimed in claim 8, wherein at least one cooling passage includes an undercut.